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Flying Operations

***HIGH-ALTITUDE RECONNAISSANCE
MISSION SUPPORT PROGRAM***

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This instruction implements AFD 11-4, *Aviation Service*. It establishes the ACC High-Altitude Reconnaissance Mission Support Program, and the procedures set forth in this instruction delineate responsibilities for this function. This instruction standardizes equipment control procedures, prescribes *physiological* support equipment requirements, states general requirements and outlines the establishment and operation of the high-altitude aircraft Physiological Support Council. This instruction does not apply to Air National Guard (ANG) or US Air Force Reserve (USAFR) units and members. Send comments and suggestions for improvements on AF IMT 847, **Recommendation for Change of Publication**, through channels, to HQ ACC/SGP, Langley AFB, VA, 23665-2791 and 9 PSPTS, Beale AFB CA. Maintain and dispose of all records, including system input/output, created as a result of processes herein in accordance with the official Air Force Records Disposition Schedule (WebRIMS) at <https://webrims.amc.af.mil/rds/index.cfm?fuseaction=ListSeries>. Contact supporting records managers as required.

SUMMARY OF REVISIONS

This document is substantially revised and must be completely reviewed. This instruction has been revised in its entirety. The title was changed from “U-2/SR-71 Physiological Support Program” to “High-Altitude Reconnaissance Mission Support Program.” Chapter 1 has a change to the general paragraph defining high-altitude aircraft as it relates to this instruction. Chapter 1, paragraph 1.5.2 and 1.6.5.14 added. It also incorporates a reference to the United States Air Force School of Aerospace Medicine (USAFSAM) Operating Location at Beale AFB CA that provides initial launch and recovery technician training. Chapter 2 has undergone minor changes. Chapter 3 has been completely revised. Chapter 4 is included in Chapter 12 and has several changes. Chapter 5 is included in Chapter 9 and has undergone several changes. This revision includes the addition of seven new chapters (chapters 6, 7, 8, 9, 10, 11 and 12). U-2/SR-71 references have been changed to high-altitude aircraft. Changes to office symbols also have been made; HQ ACC/XOFR is now HQ ACC/DOYR, HQ ACC/SGPO is now HQ ACC/SGPF,

HQ ACC/SGPT (Aerospace Physiology) has been added, HQ ACC/DOTVL is now HQ ACC/DOTO and AMC WR/LR is now WR ALC/LR.

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CHAPTER 1

PHYSIOLOGICAL SUPPORT PROGRAM

1.1. General. The physiological support program encompasses the medical and technical support provided to high-altitude U-2 aircraft operations. The integration and maintenance of physiological support systems and medical support is directed toward optimum crew effectiveness and survival.

1.2. Purpose. This instruction provides guidance for the effective management of Air Combat Command's (ACC) High-Altitude Reconnaissance Mission Support (HARMS) Program.

1.3. Scope. This instruction applies to HARMS physiological support units and to command and staff personnel responsible for the operation of these activities. This instruction also applies to all deployed high-altitude physiological support detachments.

1.4. Objectives. The ACC HARMS program is designed to:

- 1.4.1. Provide physiological support for high-altitude reconnaissance squadrons, operating locations (OLs) and worldwide contingency operations.
- 1.4.2. Provide training and indoctrination on the physiological hazards associated with high-altitude flight and in the use and function of full pressure suits and related survival, rescue and life support equipment.
- 1.4.3. Provide assistance to high-altitude aircraft pilots during launch and recovery operations.
- 1.4.4. Provide required maintenance, inspection and testing of high-altitude aircraft physiological support systems.

1.5. Organization. The 9th Physiological Support Squadron (9 PSPTS) is functionally aligned to the following levels of command:

- 1.5.1. Surgeon General, Headquarters, Air Combat Command (HQ ACC/SG).
- 1.5.2. Commander, 9th Reconnaissance Wing (9 RW/CC), Beale AFB CA.
- 1.5.3. Commander, 9th Medical Group, Beale AFB CA.
- 1.5.4. Commander, 9th Physiological Support Squadron, Beale AFB CA.

1.6. Responsibilities:

- 1.6.1. HQ ACC/SG provides the medical, technical, fiscal and administrative supervision required to carry out the physiological support program.
- 1.6.2. The ACC/SGP will:
 - 1.6.2.1. Monitor and provide command guidance to the HARMS support program.
 - 1.6.2.2. Monitor logistical requirements of physiological support functions.

- 1.6.2.3. Appoint the ACC/SGPT (Aerospace Physiology) as coordination point for aerospace physiology matters and ACC/SGPF (Flight Medicine) as coordination point for flight medicine matters.
- 1.6.2.4. May represent or appoint SGPT and/or SGPF as delegates for the ACC/SG at working group meetings and life support conferences to determine future command requirements.
- 1.6.2.5. Monitor the management of the USAF Pressure Suit Depot at Beale AFB CA.
- 1.6.2.6. Serve as the SG focal point for all matters relative to HARMS equipment that require coordination with HQ ACC.
- 1.6.2.7. Monitor, evaluate and coordinate HARMS personnel requirements for AFSC 4M0XX, 43AX and rated Aerospace Physiologist officers. HQ ACC/SGP will coordinate with HQ ACC/DOTO concerning AFSC 1T1XX aircrew life support requirements.
- 1.6.2.8. Conduct/direct staff assistance visits to 9 PSPTS as required by AFI 11-403 and this instruction.
- 1.6.2.9. Provide staff evaluation on suggestions and aircraft accident/incident reports applicable to the U-2 program. Forward those approved, together with recommendations, to appropriate agencies.
- 1.6.2.10. Coordinate as requested by the 9 PSPTS commander, with the HQ ACC Flight Operations Division, Reconnaissance and Surveillance, Standardization and Life Support and/or Training Systems and Life Support Branch on high-altitude aircraft physiological support matters which have a bearing on operational procedures.
- 1.6.2.11. Coordinate on matters pertaining to life support personnel staffing, equipment or training with HQ ACC/DOTO.
- 1.6.3. The USAF School of Aerospace Medicine (USAFSAM) is responsible for providing Operating Location (OL) support at Beale AFB for the following qualification training courses:
 - 1.6.3.1. High-altitude aircraft initial launch and recovery technician qualification training through the Full Pressure Suit Introductory Course.
 - 1.6.3.2. Full Pressure Suit Maintenance and Depot-Level Repair Course.
 - 1.6.3.3. Survival Kit and Oxygen Equipment Calibration and Maintenance Course.
 - 1.6.3.4. Detachment Supervisor Qualification Course.
- 1.6.4. The Commander, 9th Medical Group, will:
 - 1.6.4.1. Provide the medical, fiscal and administrative supervision and support required to execute the physiological support program.
 - 1.6.4.2. Monitor the physiological support program and provide necessary direction to ensure continued mission accomplishment.
 - 1.6.4.3. Remain current in physiological and life support matters and maintain close coordination with the wing commander to ensure requirements are effectively and efficiently carried out by 9 PSPTS.
- 1.6.5. The 9 PSPTS commander will:

- 1.6.5.1. Manage the physiological support function in accordance with this and other applicable directives.
- 1.6.5.2. Remain current in the latest state-of-the-art developments in physiological support and survival equipment pertinent to high-altitude aircraft operations.
- 1.6.5.3. Coordinate procedures for the care, use, control and safeguarding of all high-altitude aircraft physiological support equipment requirements with HQ ACC/SGP.
- 1.6.5.4. Ensure physiological support personnel are trained, certified and maintain proficiency on all tasks required to support the HARMS program.
- 1.6.5.5. Ensure applicable operating instructions, technical orders, manuals and equipment directives are available, current and used.
- 1.6.5.6. Evaluate all physiological support configuration changes, requests for technical data changes and material deficiency reports applicable to the HARMS program. Forward evaluations, when required, to HQ ACC/SGP and/or HQ ACC/DOTO for coordination.
- 1.6.5.7. Maintain close coordination with local and detachment commanders, aircrew members and other staff agencies on matters concerning physiological support operations for high-altitude aircraft missions.
- 1.6.5.8. Coordinate directly with the ACC/SGPT (ACCC/SG Consultant for Aerospace Physiology) on physiological support matters.
- 1.6.5.9. Contact with the Senior-Year Program Directorate (ASC/RA) is permitted, when necessary.
- 1.6.5.10. Ensure deficiency reports and other applicable reports are coordinated through HQ ACC/SGPT, ACC/SGPF, and/or HQ ACC/DOT, as appropriate.
- 1.6.5.11. Be responsible for the management of the USAF Pressure Suit Depot, Beale AFB CA.
- 1.6.5.12. Conduct staff assistance and exercise evaluation as required.
- 1.6.5.13. Support all 9 RW deployment taskings, ensure all unit type codes (UTCs) meet mission needs and ensure personnel and equipment requirements are met.
- 1.6.5.14. Ensure applicable requirements of AFI 11-301_ACCSUP1 are met, including technician OJT training, certification, documentation and task evaluations. Mobility and aircrew chemical defense requirements that support the U-2 program.

1.7. Personnel Qualifications:

- 1.7.1. Biomedical Sciences Corps officers (AFSC 43AX) and rated officers who are graduates of the Aerospace Physiology Officer Course, USAFSAM, will be assigned to HARMS functions.
- 1.7.2. It is recommended that all assigned aerospace physiology officers should participate in at least one high flight in the high-altitude aircraft to familiarize them with the operating environment and stresses of high-altitude reconnaissance missions.

1.8. Points of Contact. HQ ACC/SGPT (aerospace physiology) and HQ ACC/SGPF (flight medicine) are designated as the HQ ACC points of contact for policy, procedures and training relating to all high-altitude aircraft physiological support equipment.

CHAPTER 2

USAF PRESSURE SUIT DEPOT (BEALE)

2.1. General. The USAF Pressure Suit Depot, Beale AFB CA, is established as the single point of configuration control, maintenance and procurement of HARMS program equipment.

2.2. Objective. This section outlines the responsibilities and procedures for the management of the USAF Pressure Suit Depot (Beale).

2.3. Staff Responsibilities. The manager of the USAF Pressure Suit Depot (Beale):

2.3.1. Will be assigned in writing by HQ ACC/SGP.

2.3.2. Is directly responsible for configuration control, quality control, maintenance procedures and procurement of all physiological support equipment for the high-altitude aircraft program.

2.3.3. Is the designated command single control point for review and approval of Engineering Change Proposals (ECPs), Design Change Notices (DCNs), suggestions, configuration changes, requests for Tech Data Changes (TDCs), Material Deficiency Reports (MDRs), Unsatisfactory Reports (URs) and aircraft incident reports applicable to all physiological support equipment for the high-altitude aircraft program.

2.4. Procedures:

2.4.1. All proposals for authorization and new item procurement of physiological support-related system items for the high-altitude aircraft program will be routed through the Pressure Suit Depot manager for approval.

2.4.2. All agencies proposing changes to any environmental or physiological support-related systems of high-altitude aircraft will route the proposal through the Pressure Suit Depot manager for approval.

2.4.3. The depot manager will review all proposed changes for impact upon the physiological support program and forward the proposed change with his/her approval/disapproval (IAW appropriate technical orders) to the appropriate authority.

2.4.4. The purpose of this review is to eliminate duplicate reports or changes and to assure all are valid, properly worded, complete and assigned correct priorities.

2.4.5. One copy of each report or change proposal will be returned to the initiating activity showing action taken.

2.4.6. The USAF Pressure Suit Depot (Beale) is authorized to maintain historical records on high-altitude aircraft physiological support equipment for research purposes. These records shall be maintained for as long as the research data is deemed necessary.

2.4.7. Direct contact is authorized with WR-ALC/LR and Det 4, 645 MATS, on HARMS equipment. WR-ALC is the program management office for all U-2 items. All major decisions made by the manager of the USAF Pressure Suit Depot (Beale) that pertain to high-altitude aircraft physiological support equipment and/or their environmental systems, will be coordinated. Coordination with HQ ACC/SGP, high altitude operations at HQ ACC/DOYR, high altitude requirements at HQ AC2ISRC/C2RR, and life support at HQ ACC/DOTO is required.

CHAPTER 3

PHYSIOLOGICAL SUPPORT MANAGEMENT

3.1. General. Physiological support operations permit high-altitude aircraft aircrews to successfully operate at extremely high altitudes in a physiologically hazardous environment and to sustain life during emergency survival. In fulfilling these requirements:

3.1.1. Physiological support personnel must be qualified, trained and of the highest caliber. All personnel directly involved with high-altitude reconnaissance aircraft launch and recovery operations will be graduates of the Full Pressure Suit Introductory Course taught by the USAFSAM OL at Beale AFB. The 9 PSPTS commander may waive this requirement based on mission needs.

3.1.2. Document qualifications, certifications, initial and recurring training requirements in individual Career Field Education and Training Plans (CFETPs) and/or locally generated training forms. Contact supporting records managers as required to approve retention and disposition of these items.

3.1.3. High-altitude aircraft aircrews must be properly trained to successfully overcome the physiological hazards of high-altitude flight.

3.1.4. Physiological support equipment must be maintained properly in accordance with applicable directives, technical orders and local operating instructions.

3.2. Objective. This section outlines management responsibilities, maintenance and inspection requirements, general security and safeguarding procedures for physiological support equipment.

3.3. Staff Responsibilities:

3.3.1. The 9 PSPTS commander is directly responsible for the management of physiological support functions.

3.3.2. The primary mission of 9 PSPTS is to provide high-altitude physiological support to aircrews. All training and duties not related to high-altitude aircraft support will not interfere with the ability to accomplish this mission.

3.4. Aerospace Physiology Training Flight:

3.4.1. The following courses are conducted by the Aerospace Physiology Training Flight in support of the 9th Reconnaissance Wing:

3.4.2. One-day Original Full Pressure Suit Training as part of course (YI90001 PDS Code 3D9).

3.4.3. Passenger Full Pressure Suit Training.

3.4.4. Refresher Full Pressure Suit Training.

3.4.5. The following portions of the Instrument Refresher Course: Situational Awareness, Spatial Disorientation and any other topics coordinated with 1 RS/RTS.

3.4.6. The following courses are offered by the Aerospace Physiology Training Flight (APTF) and are conducted in accordance with AFI 11-403.

3.4.7. Original Physiological Training.

- 3.4.8. Passenger Physiological Training.
- 3.4.9. Cadet Initial Training.
- 3.4.10. Tanker, Transport, Bomber Refresher Physiological Training.
- 3.4.11. Trainer, Attack, Reconnaissance, Fighter Refresher Physiological Training.
- 3.4.12. Executive Refresher Physiological Training.
- 3.4.13. Initial High-Altitude Parachutist's (HAP) Physiological Training.
- 3.4.14. HAP Refresher Physiological Training.
- 3.4.15. Helicopter Refresher Physiological Training.
- 3.4.16. Federal Aviation Administration Physiological Training. Conducted IAW AFI 11-403 and the USAF/FAA agreement.
- 3.4.17. U-2 Pilot Interview Program. The 1 RS schedules the interview training with the APTF. The APTF, in coordination with Suit Depot is responsible for the following curriculum: A tour of the 9 PSPTS facility, ensuring a full pressure suit fit and claustrophobia check are accomplished. Forward the required form letter to the 1 RS after completion of training.
- 3.4.18. Human Performance Training (HPT). In addition to conducting scheduled training, personnel assigned to 9 PSPTS, through the auspices of the APTF, conduct as needed, "just-in-time" physiological training upon request. Human performance training may be provided, when able, to any government organization requesting support. Primary HPT emphasis will be geared towards supporting Beale AFB.
- 3.4.19. Flight Status. In order to enhance quality of instruction and familiarity with the flight environment, platform instructors are encouraged to pursue and maintain flying qualifications IAW AFI 11-403. To enhance instructor credibility and knowledge, effort should be made to gain flight experience in all weapon systems supported, with heightened emphasis placed on aircraft assigned to Beale AFB.

CHAPTER 4

TDY AIRCRAFT AND EQUIPMENT (GENERAL)

4.1. General. All personnel involved in deploying aircraft and equipment to/from duty station or while on TDY must follow this guidance.

4.2. TDY Equipment Management. Ensure equipment identified for use in departing TDY aircraft is not due inspection within 60 days of the departure date from home station. Ensure all equipment identified by Production Control (PC) for shipment to a TDY location is turned in to PC on time.

4.2.1. A copy of the parachute and survival kit inspection records will accompany aircraft departing TDY for 60 days or longer. The original inspection records will be mailed to the deployed location by any means available.

4.3. Lost and Missing Equipment. An immediate search will be conducted for equipment that is lost or missing. Personnel must follow the Lost Item Flowchart IAW AFI 21-101_ACCSUP1 and Beale AFB Supplement 1.

4.3.1. The individual involved with the aircraft is responsible for conducting the initial search for the equipment. If they are unable to locate the missing item, the NCOIC of operations will coordinate another search of the area. Inform the Operations Flight superintendent of the incident. If the missing item is still not located, the NCOIC of operations will contact the crew chief and give all assistance possible to locate the item.

4.3.2. 9 PSPTS personnel will use ACC IMT 145, **Lost Tool/Object Report**, for all lost equipment. The form will be filled out as soon as possible and given to the maintenance line supervisor.

4.4. Mission-Incident Trend Analysis. Any incident affecting the normal flow of mission procedures requires the completion of the 9 PSPTS trend analysis form. The form will record all details concerning the incident. A trend analysis will be completed on any incident involving physiological support equipment that caused a negative impact to the mission. A trend analysis will also be completed on *ANY* physiological incident (e.g.; defecation in the suit, joint pains, hypoxia symptoms), which occurred during any phase of the mission.

4.5. Facilities. Facilities will be maintained IAW applicable AFOSH Standards, T.M.14P3-GNS1031-2/1034-2, and T.O.15X-1-1 standards. The sensitivity of physiological support equipment requires strict environmental and climatic controls.

4.5.1. Store equipment neatly and ensure equipment is separated to prevent the mixing of serviceable, repairable, and unserviceable equipment items. Provisions must be taken to protect all components from dust, impurities and direct sunlight.

4.5.2. Ensure sufficient work and storage areas are available for inspections and storage. When necessary, pad and cover work benches and storage bins with material to provide smooth surfaces and edges.

4.6. Resource Protection. All personnel are responsible for safeguarding Air Force property. The NCOIC of the 9 PSPTS Supply Element is responsible for the maintenance of proper documentation and records of equipment transferred or turned in.

4.6.1. Equipment being shipped or hand-carried by 9 PSPTS technicians or pilots to TDY locations will be listed on DD Form 1149, **Requisition and Invoice/Shipping Document**, including serial number, part numbers and nomenclature. Equipment being hand-carried by crew members to another location will be coordinated with the PC Element and listed on DD Form 1149, including serial numbers, part numbers and nomenclature.

CHAPTER 5

LAUNCH AND RECOVERY PROCEDURES

5.1. General. Launch and recovery procedures fall under the guidance of the Operations Flight. All personnel conducting launch and recovery operations regardless of location must follow this guidance.

5.2. Dress and Launch Teams. These are mandatory requirements for dress/launch teams. Physiological support deployment and OL staffing will be based on this paragraph.

5.2.1. U-2ST High Flight Team. Five personnel compose the dress and integration check team (four technicians and one launch team supervisor; three personnel are on the launch team (two technicians and one launch team supervisor).

5.2.2. U-2S High Flight Team. Three personnel compose a U-2S high flight team (two technicians and one launch team supervisor).

5.2.3. U-2ST Low Flight Team. Three personnel compose a U-2ST low flight team (two technicians and one launch team supervisor).

5.2.4. U-2S Low Flight Team. Two personnel compose a U-2S low flight team (one technician and a launch team supervisor).

5.2.5. Launch Team Supervisor. The launch team supervisor will perform the final cockpit check.

5.2.6. Deviations from the prescribed team composition described above should be avoided, but if required, must be approved by the 9 PSPTS commander and/or the Pressure Suit Depot manager.

5.3. Preflight Physical. A preflight evaluation will be accomplished prior to each high flight. The evaluation will at a minimum include the following: temperature, blood pressure, and an ENT review. A brief 24-hour history of the aircrew member's health will also be recorded. This history will include the amount of sleep of the aircrew member and the food eaten prior to reporting to 9 PSPTS for the flight. Prior to training missions, this interview may be given by an aerospace physiologist or qualified physiological support personnel. Should any question arise as to the aircrew member's medical condition, the flight surgeon on call and the mobile officer will be contacted immediately.

5.4. Denitrogenation. Physiological support personnel will ensure that aircrews are dressed, tested and denitrogenated on 100 percent oxygen for a minimum of 60 minutes prior to scheduled launch of high flights. The launch supervisor must pass on oxygen prebreathing start times to the mobile pilot prior to engine start. Denitrogenation times will be closely observed. Deviations in scheduled prebreathing start time will be annotated on the flight sheet and reported to the mobile officer prior to engine start. Prebreathing is not required for low flights.

5.4.1. The 100% oxygen pre-breathe may be performed in conjunction with mild exercise to enhance denitrogenation. The procedures used must be approved by the chain of command and supervised by 9 PSPTS personnel.

5.4.2. If the crew member does not complete prebreathing requirements prior to takeoff, document the flight sheet and report it to the mobile pilot. It must also be reported to the commander/superintendent, Operations and Logistics Flight, and on-call flight surgeon as soon as possible. The 9 PSPTS commander will then brief the Operations Group commander. At forward operating locations (FOLs),

the 9 PSPTS supervisor will notify the OL operations officer and flight surgeon of deviations from prebreathing requirements.

5.4.3. Crew members must arrive at physiological support for dress and integration procedures no later than 1 hour and 15 minutes prior to scheduled launch time.

5.5. Launch and Recovery Supervisor Responsibilities. Supervisors are responsible for all physiological support tasks and procedures associated with launch and recovery of low and high-altitude reconnaissance aircraft.

5.6. Pilot Underwear Management. Applies to all personnel involved with dressing pilots and those assigned to the Operations Element.

5.6.1. S-1031 Suits. Each pilot with one suit is issued three sets of underwear. If issued two suits, five sets of underwear are authorized. Two sets will be taken out of the package and numbered according to the pilot's subject number and stored in his/her locker. The rest remain in the package.

5.6.2. S-1034 Suits. Each pilot with one suit is issued three sets of regular underwear and two sets of Patagonia underwear. If issued two suits, five sets of regular underwear, and two sets of Patagonia underwear. Two sets will be taken out of the package and numbered according to the pilot's subject number, and stored in his/her locker. The rest remain in the package.

5.6.3. After use, the underwear will be washed, dried and placed back in the pilot's locker. All underwear will be inspected after cleaning for tears, rips and proper subject number.

5.6.4. All orders for new underwear will be coordinated through the NCOIC, Suit Maintenance Element. Additional new or unmarked tops (both high and low neck), bottoms, UCD briefs and socks will be stored according to size in the appropriately marked lockers in supply. Velcro UCD hole covers will be stored in the pilot's locker room.

5.7. Tube Food and Fluid Management. The NCOIC, Supply will be responsible for requisitioning, storing and maintaining records to establish annual requirements of tube food.

5.7.1. Tube foods will be stored in the supply warehouse. Expiration of tube foods will be 4 years from date packed stamped on crimp. Any tube food that has been issued for flight and not consumed cannot be reissued for any subsequent flight. Expired and unused tube foods will be disposed of.

5.7.2. All tube foods will be monitored for expiration dates. Each box of the tube food must be plainly marked with the expiration date. The Operations Element will ensure that tube food removed from supply and put into use comes from the oldest stock. Each carton of tube food stored in the operations tube food locker will be marked to indicate the type of food and expiration date. The ready-for-use tube food will be kept in the tube food locker.

5.7.3. Sports drinks, Fruit Juices and Drinking Bottles. The NCOIC, Supply will be responsible for requisitioning, storing, and maintaining records to establish annual requirements of sports drinks and drinking bottles.

5.7.3.1. Sports drinks will be stored in the supply warehouse and the ready-for-use stock will be stored in the operations refrigerator.

5.8. Aircraft Load, Prior-To-Entry Inspection and Pilot Hookup. The launch crew is responsible for pilot particulars during the upload of aircraft.

5.8.1. Parachutes and survival kits will be loaded at least 3 hours prior to aircraft launch time. Checklists and a two-man concept will be used at all times. A technician who completes the load cannot perform the prior-to-entry check. A second technician will complete the prior-to-entry checklist and verify correct aircraft load completion by utilizing the appropriate checklist.

5.8.2. When personal parachute and survival kits are removed, physiological support personnel will document the AF IMT 781A aircraft forms using a Red X entry. Red X entries will be cleared by a certified physiological support supervisor. Personnel authorized to clear Red X symbols will be documented on ACC IMT 64 and kept on file in the Operations Element. Contact supporting records managers as required to approve retention and disposition of ACC IMT 64.

5.8.3. Pilot hookup will be performed using a two-man concept. One technician will perform prior to entry inspection. Once the prior-to-entry is complete, the second technician will perform the pilot hookup and integration. The prior-to-entry and pilot hookup and integration cannot be performed by the same technician. One technician will then read aloud the "supervisor's aircraft integration checklist" while the supervisor physically checks all items with adherence to established procedures and checklist use.

5.9. Aircraft Recovery. The recovery team will consist of two technicians for all U-2S high flights and U2ST low-flight recoveries. The recovery team will consist of one technician for all U-2S low flights. The following procedures will be followed:

5.9.1. Pilot Debriefing. After all flights, the technician recovering the pilot will query each individual on the items listed on the high- and low-flight data forms and make comments on the form as necessary. Enter any equipment problems in the write-up section of the pre/postflight sheet. Be specific with explanation. Pilot special requests should be updated on particular card.

5.9.2. The preflight/postflight data sheets will be completed and turned into the NCOIC of the Operations Element for review and turned in to Production Control the morning following the flight.

5.9.3. Malfunctions that require immediate attention (e.g., excessive liquid oxygen depletion, rapid decompression, physiological symptoms, etc.) will be brought to the attention of the Operations Flight commander and/or superintendent immediately.

5.10. Emergencies:

5.10.1. Decompression Sickness (DCS). In the event a pilot is recovered from the aircraft and is complaining of symptoms which may relate to evolved gas decompression sickness and an emergency was not previously declared, the following procedures will be followed:

5.10.1.1. Refer to EMERGENCY PROCEDURES FOR EVOLVED-GAS DECOMPRESSION SICKNESS DISCOVERED AT THE TIME OF A/C RECOVERY checklist inside the 9 PSPTS flight line checklist. As a minimum, the following steps will be accomplished:

5.10.1.1.1. Place pilot on 100 percent oxygen and ventilation--use LOX ventilators.

5.10.1.1.2. Place pilot in the van with minimum walking.

5.10.1.1.3. Assure pilot is in a reclining position.

5.10.1.1.4. Contact the 9 PSPTS Operations Element--instruct them to alert the flight surgeon, the Operations Flight Commander/Superintendent and 9 PSPTS commander. The Operations Element will ensure additional LOX ventilators and the oxygen mask/regulator/hoses are readily available.

5.10.1.1.5. Return to 9 PSPTS integration room.

5.10.1.1.6. Remove pilot's boots, gloves and helmet. If available, place tight-fitting aviator's oxygen mask on pilot.

5.10.1.1.7. Record breathing rate, pulse and other objective and subjective symptoms every 15 minutes.

5.10.1.2. Transportation of Patients for Hyperbaric Therapy. The office of primary responsibility (OPR) for procedures concerning DCS treatment and transportation is the 9th Medical Operations Squadron/SGP. The 9th Medical Group will transport the individual for treatment IAW 9 MDG Instruction 48-10.

5.10.1.2.1. All hyperbaric patient movement will be coordinated with USAF David Grant Medical Center Hyperbaric Medicine Department, Travis AFB CA DSN 799-3987 (Com: 707-423-3987) during duty hours, or DSN 799-3826 (Com: 707-423-3826) after duty hours.

5.10.1.2.2. If the incident is not in the Beale AFB area, patient movement will be coordinated with the USAF Hyperbaric Medicine Center (USAF School of Aerospace Medicine, Brooks City-Base TX). Call DSN 240-3281 (during duty hours) or DSN 240-3278 or commercial (210) 536-3278 (after duty hours) and ask for the on-call Hyperbaric Medicine Physician.

5.10.2. Aircraft Mishap. Upon notification, the NCOIC, Operations will initiate the checklist and remain at the operations desk to control the situation. Notify all personnel up the chain of command including the 9 PSPTS commander. Coordinate the immediate dispatch of a senior representative to the 9 RW battle staff. The individual should have the appropriate area open on their restricted area badge.

5.10.2.1. The NCOIC, Operations will coordinate the immediate impoundment of all equipment and documentation concerning the affected flight. Impound the OJT records of all personnel involved in the preparation (including preflight) and launch of the mishap aircraft. Contact the Aerospace Physiology Training Flight for collection of the aircrew member's AF IMT 699. Contact supporting records managers as required to approve retention and disposition of all records.

5.10.2.1.1. If the mishap aircraft was being flown high, impound the ventilators that were used for the flight. An oxygen sample will be taken from these ventilators.

5.10.2.1.2. The depot manager will select an area to be used as the initial collection point for all impounded documentation and equipment. Lock and key must secure the area. The depot manager will be responsible for the disposition of impounded items.

5.10.2.1.3. The crew member's personal belongings will be secured in their locker until an authorized individual comes to pick them up. This individual must sign a hand receipt for items.

5.10.3. In-Flight Emergency (IFE). When informed that there is an IFE, the NCOIC of operations will notify the Operations Flight commander/superintendent and dispatch the recovery crew and

supervisor to the flight line with the safety pins and appropriate flight data sheets. Send a ventilator with all hoses for high flights.

5.10.4. Aircraft Diverts. Contact the Maintenance Operations Center (MOC) for clarification and coordination of the recovery location. Ensure the recovery crew takes a checklist, all affected aircraft equipment (safety pins) and documentation to recovery site. Ensure the scramble handle, seat pan and D-ring covers are available.

5.11. Full Pressure Suit Infection Control Procedures. Infection control procedures will be conducted in accordance with AFI 44-108 and applicable medical group instructions and manuals. Personnel must wear latex gloves when working with suit components contaminated with excretions or secretions other than perspiration (e.g., blood, urine and/or feces).

5.11.1. Pilot urine collection devices will be cleaned after use IAW T.M.14P3-GNS1031/34-2. Contaminated items (e.g. suit liners, gas container) will be removed from the suit and laundered. The gas container will then be cleaned IAW T.M.14P3-GNS1031/34-2. Any component of the full pressure suit that cannot be completely cleaned will be disposed of using a large biohazard bag. The bag will be taken to the medical facility for proper disposal.

CHAPTER 6

TEMPORARY DUTY

6.1. General. The 9 PSPTS commander is responsible to ensure personnel are available to support all UTC taskings.

6.2. Logistics Flight Commander/Flight Chief Responsibilities. The Logistics Flight commander/flight chief is responsible for the management and assignment of TDY personnel to all FOLs and contingency operations.

6.3. Tour length. Normally the TDY tour length to all detachments is 60 days, excluding travel time. Contingencies and national tasking will be as directed by the tasking authority. Every effort will be made to rotate personnel every 90 days.

6.4. Selection Process. Selection of personnel to fill TDY positions will be made by the Logistics Flight commander/flight chief and approved by the 9 PSPTS commander. Criteria used to select personnel to fill TDY positions will be the return date from last deployment. This does not include short TDYs (less than 30 days).

6.5. TDY Credit. TDY credit for rotational purposes will be given for mission support TDYs of 30 days or more. This includes PME and formal training schools (over 30 days). A separate roster will be maintained for all TDYs less than 30 days.

6.6. TDY Exemptions and Exceptions. The 9 PSPTS commander is the approval authority for TDY exemptions. Exceptions will be handled on a case-by-case basis. Personnel may at any time request that they be allowed to go TDY instead of being waived under these guidelines. The following general guidelines are provided:

6.6.1. A flight surgeon must confirm medical exemptions. Duties-not-including-flying status does not constitute physical profile change for TDY status. Member will retain last return date and may be susceptible to a TDY immediately after completing the deferment. If a member was scheduled for a TDY location and becomes medically exempt for that TDY, every effort will be made to reschedule them for that same location as soon as the physical profile has been lifted.

6.7. TDY Preparation Actions. Personnel selected for TDY are responsible for completing all required actions prior to departure from home station. Personnel will be required to complete the out-processing checklists prior to final out-processing at PRU. On the day of departure, personnel will sign out by calling the detachment coordinator or in person at 9 PSPTS. If the detachment coordinator is not available, leave a message on the Logistics Flight answering machine.

6.8. TDY Return Actions. Members must report to the Logistics Flight on the next duty day immediately following their return from TDY. During this duty day, members are responsible for completing all TDY in-processing requirements. Following completion of these requirements, the Logistics Flight will officially identify the next day as the first day of member's compensatory time off entitlement.

6.8.1. Trip reports and Letter of Evaluations (LOEs) are mandatory from supervisors and strongly encouraged from technicians returning from any TDY, airshow or contingency. They will be filed with the detachment coordinator on the first official duty day after return from TDY. It will then be routed through the squadron and reviewed by the 9 PSPTS commander. The report will include but not be limited to the following topics: purpose of trip and inclusive dates, travelers, personnel, facilities, billeting support, equipment, tours, operations, vehicles and other comments.

CHAPTER 7

DETACHMENT MANAGEMENT

7.1. General. The management of all detachments, FOLs, contingency operations and launch and recovery commitments is the responsibility of the deployed supervisor.

7.2. Detachment Management. Management at the forward operating locations is the responsibility of the senior-ranking detachment supervisor. They must ensure complete physiological support for high-altitude reconnaissance aircraft. They are also responsible for all physiological support equipment, personnel and resources under their control.

7.2.1. The supervisor must ensure all personnel are properly in-processed and out-processed through the OL's orderly room. All personnel **must** have their OJT folders checked and a safety briefing must be conducted and documented in the training records. OJT folders will be taken TDY unless waived in writing by the gaining commander. Contact supporting records managers as required to approve retention and disposition of records.

7.3. Chain of Command. While deployed, the physiological support personnel will be assigned to the deployed flying squadron director of operations.

7.4. Changeover Responsibilities. The incoming and outgoing supervisors will perform a complete inventory of equipment. This inventory will be documented and a copy will be kept on file at the detachment and a copy will be forwarded to the detachment coordinator.

7.5. Equipment Use. Equipment rotation is important to distribute wear and use evenly. The supervisor is responsible to ensure the correct equipment is flown, write-ups have been cleared and adequate time is left on the equipment to complete the mission.

7.6. Flight Debriefing. The supervisor should conduct the pilot debrief, ensuring any pertinent information is gathered on any equipment problems. If there has been a problem with 9 PSPTS equipment that interfered with the successful completion of the mission or interfaces with other aircraft systems, the supervisor will attend the pilot debrief with maintenance.

7.7. Flight Data Sheet Processing. After review of all flight data sheets, supervisors must ensure all discrepancies are noted and the work distributed to the appropriate individual responsible for the repair. All write-ups should be completed as soon as possible. File all flight-related paperwork and annotate all other pertinent information to corresponding sheets no later than 1 duty day following the flight. Contact supporting records managers as required to approve retention and disposition of related paperwork and other pertinent information.

7.8. Evasion Charts. Evasion charts are obtained from the intelligence officer. The maps are placed in the seat kit cushions as needed for the missions flown. Remember to remove these maps prior to shipping a seat kit to Beale.

7.9. Fire Department Training. Fire departments at OLs require aircraft emergency extraction training. Normally this training is requested by the fire department at least once a quarter. If a request has not been

received, notify the appropriate chain of command that will contact the local fire department to arrange the training.

7.9.1. As a minimum, all detachment supervisors must be trained in this procedure. All training must be annotated in the OJT training record or six-part folder.

7.9.2. This training should also be given to local agencies that might be involved in recovery of a pilot.

7.10. Suit/Pilot Extraction Training. A video, instruction guide and Kevlar scissors are required at all detachments. This training must be given to search and rescue teams who might be involved in recovery of a pilot.

7.11. Physiology Support Vehicles. The 9 PSPTS pilot transport vans may be used as emergency response vehicles. An example would be to drive a crew member with DCS to the dive chamber. It would, however, be better to use a rental van or emergency response vehicle for this if one were available. It should not be used for anything else but physiological support.

7.12. Supply. Detachment supervisors are responsible for ensuring that there is a 60-day supply of parts, equipment, tube food and sports drinks on hand.

7.12.1. You may order parts not available through the OL supply section from 9 PSPTS. If you do this, you must include on the weekly message the part number, part nomenclature and technical manual reference, to include page number. Tube food will be ordered from Beale.

7.12.2. Sports drinks, water, washing powder, bleach, dryer sheets and other necessities may be purchased through the local commissary. If this has not been established, it is up to the detachment supervisor to initiate this procedure. Work through your chain of command for assistance.

7.12.3. Shipping Pilot Suits: Pilot suits are shipped by Federal Express. If both suits are shipped, pilots must hand carry their low-flight helmet due to the length of time it takes for transportation to Beale. The only time that the low-flight helmet and mask may be shipped with the suits is when the pilot is going on leave immediately after the TDY. Any deviation to this requires the pilot to receive approval from the DO. Annotate this on the packing list. Hazardous declarations must be accomplished in accordance with appropriate directives. Include TCNs on the weekly message to 9 PSPTS.

7.12.4. Shipping survival gear. When shipping survival kits and parachutes to Beale, fill out a DD Form 1149, ensure removal of all location-specific equipment, and label the box accordingly. TMO will print out the Shipper's Declaration form and take it from there. Make sure you get a TCN number for the DD 1149. Pass the TCN number on to Beale in the next weekly message.

7.12.5. Shipping Documentation. DD Form 1149 will be completed for all shipments of equipment. Accomplish five copies of the DD Form 1149. One copy will be placed inside the container and a second copy will be placed on the outside of the container. If the shipment is to be hand-carried, a copy is given to the courier (the courier will sign the DD Form 1149). One copy goes to supply and a copy is faxed to PC. Maintain and dispose DD Form 1149 copies in accordance with the official Air Force Records Disposition Schedule (WebRIMS) at . Contact supporting records managers as required to approve retention and disposition of these items.

7.12.6. **Equipment Status and Inventory:** The detachment supervisor is the custodian for all equipment. Each supervisor is responsible for completing an inventory within 7 days of arrival at the OL, and for single supervisor locations, an inventory upon their departure.

7.13. Low-Flight Helmets and Oxygen Masks. Inspection of low-flight helmets and oxygen masks will be conducted in accordance with all applicable directives. Personnel must be trained and certified to perform this inspection. If there is a lack of equipment or facilities do not meet the minimum standards to perform these inspections, other arrangements must be made. This can be accomplished with a host-tenant agreement with a local life support shop. At no time will low-flight helmets and masks be allowed to fly without current inspection dates.

7.14. Precision Measurement Equipment Laboratory (PMEL). All equipment must be calibrated and current before use. Arrangements must be made either locally or elsewhere to have equipment requiring PMEL calibration. The only item calibrated outside the local area is the 4140 calibration kit. It is the supervisor's responsibility to ensure equipment is calibrated in accordance with directives and has current inspection dates.

7.15. PRC-112 Series Radios and Code Loader. Survival kits will be reconfigured to accommodate the radio and spare battery at the OL. Make certain the AFTO IMT 338, **Survival Kit Record**, reflects the serial number of the installed PRC-112. The AFTO IMT 95, **Significant Historical Data**, must reflect that the kit has been reconfigured with the PRC-112. It must also include the serial numbers of the PRC-90 that was replaced. A PRC-112 loader is required for uploading the codes into the radios. Personnel who will be uploading codes must be trained and certified to perform the task.

7.16. Evolved-Gas Decompression Sickness. Procedures outlined in Chapter 5, paragraph 5.10, should be followed. Local procedures must also be established. The flight surgeon will be the key to the success of the treatment. Because of the remote detachment locations, effort must be made to inform the 9 PSPTS command staff.

7.16.1. **Transportation.** Transportation to a treatment facility must be planned in advance and memoranda of agreement will be locally drafted with coordination through the 9 MDOS/SGOAF, 9 PSPTS, and the USAF Hyperbaric Medicine Center, USAFSAM/FEH, Brooks City-Base TX. Phone numbers for the USAF Hyperbaric Medicine Center are listed in paragraph 5.10.1.2.2.

7.16.2. **Emergency Evacuation Hyperbaric Stretcher (EEHS).** For the pilot who has developed DCS (or arterial gas embolism/AGE) at detachments serviced by an EEHS and a trained provider/operator hyperbaric treatment team, the EEHS should be used to initiate hyperbaric oxygen therapy and, if warranted, transport the affected pilot to the nearest approved medical treatment facility. As in other situations, supervising physicians should consult with the USAF Hyperbaric Medicine Center and coordinate treatment accordingly.

7.17. Staff Assistance Visits. The 9 PSPTS quality assurance section will schedule a staff assistance visit once a year. The purpose of this visit is to ensure OLs are meeting minimum acceptable standards and are following the 9 PSPTS detachment operating instruction. This visit will also serve as an opportunity to provide assistance on matters of importance to each OL. A two-person team will perform the visit at a time that is convenient for the location and 9 PSPTS. Reports will be filed at the OL and a copy will be

routed to the 9 PSPTS commander. Contact supporting records managers as required to approve retention and disposition of reports.

7.18. Message Traffic. A weekly message will be completed and sent by close of business on Monday evening. Messages may be e-mailed or faxed to the equipment logistics technician and the PSPTS Logistics Flight commander/flight chief. Maintain and dispose the message in accordance with the official Air Force Records Disposition Schedule (WebRIMS) at . Contact supporting records managers as required to approve retention and disposition of these items.

7.19. Recall Rosters. Supervisors are responsible for providing a current recall roster to the director of operations and the PSPTS detachment coordinator.

7.20. Trip Reports. Before departing, ensure a copy of all trip reports are filed at the OLs. Maintain and dispose of reports in accordance with the official Air Force Records Disposition Schedule (WebRIMS) at . Contact supporting records managers as required to approve retention and disposition of these items.

7.21. Facilities. The detachment supervisor is the facility manager for the 9 PSPTS section and all related rooms unless otherwise directed. The supervisor will ensure that the 9 PSPTS element is clean.

CHAPTER 8

EQUIPMENT MAINTENANCE PROCEDURES AND TRACKING

8.1. General. HARMS equipment is designed to sustain aircrew members during flight and to provide environmental protection in any survival situation resulting from bailout, crash landing or ditching. The mission and environment of the high-altitude aircraft require special equipment to provide maximum protection on a global basis.

8.1.1. 9 PSPTS provides within ACC field depot functional activity for all physiological support equipment, including equipment and procedures standardization. All 9 PSPTS personnel must maintain constant surveillance over aircrew life support equipment and initiate deficiency or hazard reports IAW appropriate directives. Physiological support problems will be coordinated with HQ ACC/SGP for resolution. HQ ACC/SGP will coordinate with ACC/DOTO, AC2ISRC/C2RR and WR-ALC/LR, as required.

8.2. Maintenance and Inspection of Physiological Support Equipment:

8.2.1. All high-altitude aircraft physiological support equipment will be maintained, inspected and repaired in accordance with applicable technical orders and manuals and other related physiological support equipment directives. The following will be accomplished:

8.2.2. All physiological support equipment inspections and equipment location will be tracked using the computer-based PSPTS 2000 Information Management System. Hard-copy records must still be maintained. Contact supporting records managers as required to approve retention and disposition of the records.

8.2.3. Maintain a current index, technical order, technical manual and publication file for all high-altitude aircraft life support equipment. The 9 PSPTS commander will maintain equipment accountability in accordance with applicable directives. Contact supporting records managers as required to approve retention and disposition of accountability records.

8.2.4. Track the status of all incomplete modifications and current Time Compliance Technical Orders (TCTOs) and inspections required on all high-altitude aircraft physiological support equipment.

8.2.5. Maintain applicable AFTO inspection forms on file for record/control purposes. Equipment may be identified with a locally assigned number in addition to the manufacturer's ID number to aid in maintaining accountability.

8.2.6. Parachute/fabrication personnel will accomplish all inspections requiring inflation testing of life rafts in accordance with applicable technical orders.

8.2.7. Only physiological support personnel are authorized to install and remove survival kits and parachutes in high-altitude aircraft and to perform preflight connections and postflight disconnections of high-altitude physiological support systems.

8.2.8. Physiological support personnel will use locally developed checklists for all equipment inspections and cockpit hookup of physiological support systems. The 9 PSPTS commander or designated representative will review forms and checklists at least semiannually. Records will be kept to docu-

ment compliance. Contact supporting records managers as required to approve retention and disposition compliance documentation.

8.2.9. NCOs with a 7-skill level or higher will be assigned to the quality assurance section. As manning dictates, selected 5-level personnel may be authorized to perform this task if designated in writing by the 9 PSPTS/CC.

8.2.10. Beale Form 356, **Inspection Data Timeline**, will be used for all high-altitude aircraft equipment items where flying time, downtime or use time is maintained. Accumulated time continues on all equipment after overhaul. The periodic inspection time will be restarted after each inspection.

8.2.11. AFTO IMT 95, **Significant Historical Data**, will be kept on equipment to reflect significant historical data; i.e., TCTO compliance, bootie or face seal replacement, visor change, etc. It will also be used to record routine periodic, annual and 24/36-month inspections. Adjustments, repairs and condition of the equipment item will be noted on the AFTO IMT 95 at each inspection interval.

8.2.12. High-flight data sheets will be used for each flight to reflect all equipment used. These sheets will be retained in accordance with the Air Force Disposition Schedule, then forwarded to the USAF Pressure Suit Depot (Beale) for disposition.

8.2.13. Checklists for maintenance inspections will be kept until the equipment is due factory overhaul. Contact supporting records managers as required to approve retention and disposition of reports of checklists.

8.2.14. The inspection and maintenance of survival kit equipment will be recorded in the Aircrew Life Support Management System (ALSMS) or the appropriate AFTO forms.

8.2.14.1. AFTO IMT 334, **Helmet and Oxygen Mask/Connector Inspection Data**, for HGU-series flying helmets and MBU-series oxygen masks.

8.2.14.2. AFTO IMT 336, **Life Preserver Inspection Record**, for life preservers.

8.2.14.3. AFTO IMT 338, **Survival Kit Record**, for survival kits.

8.2.14.4. AFTO IMTs 391, **Parachute Log**, and 392, **Parachute Repack, Inspection and Component Record**, for parachutes and low-flight harness.

8.2.15. Physiological support personnel are authorized to calibrate all testers and equipment (related to the 9 PSPTS function) using the master calibration kit (DN-D278-4140-3 or electronic calibration kit).

8.2.16. All physiological support equipment required for a low flight will be maintained, inspected and repaired by qualified physiological support personnel at FOLs.

CHAPTER 9

SURVIVAL EQUIPMENT

9.1. General. The survival equipment falls under the Operations Flight. All personnel assigned to the area must follow this guidance.

9.2. Survival Kit Components. The 9 RW/CC is authorized to make changes in the components contained in the survival kit.

9.2.1. To make changes to the mandatory items contained in the survival kit, the recommended change must be forwarded to the 9 PSPTS commander. The 9 PSPTS commander will complete a feasibility study and send it together with recommended change to the 9 RW/CC for approval. If approved, coordination will then be made with HQ ACC/SGP.

9.2.2. The following paragraphs identify the mandatory components and the quantity included in the survival kit:

- 9.2.2.1. Life Raft/1 Each
- 9.2.2.2. AP/25S-5A/1 Each
- 9.2.2.3. Flares, Mark 13-MOD 0 or Mark 124/2 Each
- 9.2.2.4. Mirror, Signaling/1 Each
- 9.2.2.5. Sea Marker Dye, 1 Each/Sea Rescue Streamer, 1 Each
- 9.2.2.6. Box, Waterproof w/Matches/1 Each
- 9.2.2.7. Kit, First Aid, Tropical (Box)/1 Each
- 9.2.2.8. Tourniquet/1 Each
- 9.2.2.9. Whistle, Plastic/1 Each
- 9.2.2.10. Survival Radio /PRC 90/112/1 Each
- 9.2.2.11. Spare Radio Battery/1 Each
- 9.2.2.12. Water, Drinking (Canned)/1 Each
- 9.2.2.13. Knife, Pocket/1 Each
- 9.2.2.14. Life Raft Repair Plugs/2 Each
- 9.2.2.15. Socks, Wool/1 Pair
- 9.2.2.16. Water Bag, Three Quarts/1 Each
- 9.2.2.17. Compass, Lensatic/1 Each
- 9.2.2.18. Manual Reverse Osmosis Desalinators (MROD)/1 Each
- 9.2.2.19. *Special Mission Signaling Kit/1 Each
- 9.2.2.20. Strobe Light/1 Each
- 9.2.2.21. *Strobe Light Filter/1 Each

- 9.2.2.22. Mittens, Exposure/1 Pair
- 9.2.2.23. *Survival Weapon, 9 mm/1 Each *9mm Ammunition
- 9.2.2.24. Saw, Survival/1 Each
- 9.2.2.25. Sponge (camouflage)/2 Each
- 9.2.2.26. Wire Snare/20 Feet
- 9.2.2.27. Space Blanket/1 Each
- 9.2.2.28. Wool Ski Cap/1 Each
- 9.2.2.29. Goggles, Ski, Plastic/1 Pair
- 9.2.2.30. Survival Manual, AFM 64-5/1 Each
- 9.2.2.31. Note: *= Equipment used at OLs.

9.2.3. The NCOIC or assistant must ensure all hazardous waste materials are disposed of in accordance with applicable directives.

CHAPTER 10

SUPPLY REQUISITION AND MANAGEMENT

10.1. General. The 9 PSPTS Supply Element NCOIC and/or custodian are responsible for the requisitioning and receipt of all physiological support supplies and equipment. Other responsibilities include turn-in and/or shipment of 9 PSPTS assets, storage and day-to-day issuing of supply items and maintaining base supply (01) account. The 9 PSPTS supply NCOIC is responsible for ensuring inventory and complete accountability practices are adhered to at all times, and that supply transactions are completed expeditiously. Detachment supervisors should use this guidance to assist them in OL supply actions.

10.2. Requisitioning. Request local purchase items using DD Form 1348-6, **DOD Single Line Item Requisition System Document**, through base supply and medical supply.

10.2.1. Prepare AF IMT 2005, Issue/Turn-in Request Document or AF IMT 601, **Equipment Action Request Document**, for ordering EAID (equipment authorization inventory data) and non-EAID items through base supply.

10.2.2. Prepare AF IMT 601 to request changes to the special list of equipment (SLOE) record and forward to WR-ALC/LRLDA, Robins AFB GA, for approval (Ref: Logistics Support Plan LSP 400-1).

10.2.3. Submit AF IMT 601 to 9 MDSS Medical Logistics Element (9 MDSS/SGSL) when ordering medical equipment.

10.2.4. Request individual equipment items using form letter. This letter will be hand-carried by 9 PSPTS personnel to the Individual Equipment Element (IEE).

10.2.5. Walk-through DeCA Form 70-20, **Subsistence Request**, to the budget office for the funding and then take to the commissary warehouse for issue of request items.

10.2.6. Contact appropriate supply source for oxygen, air and nitrogen requirements for the Aerospace Physiology Training Flight, Operations Element and Suit Maintenance Element.

10.2.7. Fax requisitions for "GN/DN" part numbers to WR-ALC/LRLDA will use request number FM4686.

10.2.8. Use the International Merchants Purchase Authorization Card (IMPAC) to purchase supplies and/or services.

10.2.9. Prepare AF IMT 3215, **Communications-Computer Systems Requirement Document**, and AF IMT 9, **Request for Purchase**, for all computer and communications (i.e., pagers and radios) equipment for purchase or repair.

10.2.10. Process AF IMT 9 through the 9th Contracting Squadron to purchase aviation eyewear through Nicolaus Louis Optometry for urgent requirements, or routinely requisition through 9th Medical Group Optometry Clinic.

10.2.11. Prepare a Request for Local Purchase Evaluation and Approval, to order nonmedical local purchase items through medical supply.

10.3. Research. Research supply and medical requests by utilizing catalogs, pamphlets and various other research catalogs. Verify all requested part numbers or national stock numbers using the Federal Logistics and Weapons System Spare Listings prior to ordering expendable and nonexpendable items through base supply, medical supply or WR-ALC/LRLDA.

10.4. Receiving:

10.4.1. Process all issues and due-out releases from base supply and WR-ALC/LRLDA on DD Form 1348-1, **DOD Single Line Item Release/Receipt Document**.

10.4.2. Process DD Form 250, **Material Inspection and Receiving Report**, from factories. Send signed and annotated copies to WR-ALC/LRLDA, Robins AFB GA.

10.4.3. Pick up property from the 9th Transportation Squadron's Shipment Distribution Center upon notification of a shipment from the factory, WR-ALC/LRLDA, DOD agencies or detachments. Operate forklift as required for moving heavy boxes/crates.

10.4.4. Pick up items with government pick up letter or IMPAC provided by contracting office when required.

10.5. Turn-in:

10.5.1. Prepare AF IMT 2005 or AF IMT 601 for turn-in of equipment and supplies to the 9th Supply Squadron. Obtain disposition instructions from WR-ALC/LRLDA for all SLOE and directed spares level (DSL) items prior to turn in.

10.5.1.1. Prepare AF IMT 2005 for all munitions issue and turn-ins.

10.5.2. Prepare and tag all unserviceable items to be turned in for direct shipment to the Defense Reutilization and Marketing Office.

10.5.3. Prepare AF IMT 601 and tag all unserviceable medical items and property to the Medical Logistics Management Element.

10.5.4. Process precious metal assets to base supply and dispose all metals through the Beale AFB Metal Recovery Program.

10.5.5. Process hazardous material for turn-in to the 9th Civil Engineer Squadron's Environmental Quality Element.

10.6. Shipment:

10.6.1. Prepare DD Form 1149, **Requisition and Invoice/Shipping Document**, for all items shipped to the factory, detachments, DOD agencies and local vendors through 9th Transportation Squadron's Shipment Distribution Center.

10.6.2. Provide copy of DD Form 1149 to WR-ALC/LRLDA, Robins AFB, GA, after shipping property for repair or overhaul on a monthly basis.

10.6.3. Maintain suspense copy of DD Form 1149. Contact supporting records managers as required to retention and disposition of the form.

10.6.4. Prepare/maintain Dangerous Goods Forms for hazardous shipments via commercial or military carriers. Contact supporting records managers as required to approve retention and disposition of forms.

10.7. Contracting:

10.7.1. Prepare an AF IMT 9 for all contract repairs, commercial purchases and contract services. Walk-through priority AF IMT 9s to budget and commercial services and pick-up items with government pick-up letter provided by contracting.

10.7.2. Prepare an AF IMT 9 for all office equipment (e.g., typewriters) requiring annual preventive maintenance contracts.

10.7.3. Sign DD Form 1155, **Order for Supplies or Services**, when contracted repair, commercial purchases and services have been accomplished; send signed copies to commercial services and maintain a copy. Contact supporting records managers as required to approve retention and disposition of the form.

10.7.4. Prepare DD Form 1149 to ship assets for repair to local vendor.

10.8. Monitoring:

10.8.1. Coordinate with the appropriate 9 PSPTS maintenance element, reviewing their requirements by using the M30, monthly due-out validation listing.

10.8.2. Screen the daily document register (D04) for all transactions affecting 9 PSPTS organizational accounts 111, 313, 323, 462 and 663.

10.8.3. Update funds availability chart daily using the DO4 and Microbas funds update provided by the budget office.

10.8.4. Screen obligated due-out listing (M36) to ensure firm due-outs are on order.

10.8.5. Ensure medical supplies and equipment on order are reflected in the medical logistics back order listing.

10.8.6. Review the repair cycle asset management listing (D23) for due-in from maintenance.

10.8.7. Use the SLOE and DSL change letter reports to ensure accuracy of inventory and accountability of SLOE and DSL assets.

10.8.8. Monitor high-altitude aircraft pilot aviation eyewear being processed by the Optometry Clinic or Nicolaus Optometry.

10.8.9. Monitor medical funds as cost center manager.

10.8.10. Track priority requisitions or services and annotate progress report on status board.

10.9. Suspense File. (Contact supporting records managers as required to approve records retention and disposition.)

10.9.1. Maintain a suspense file system of all copy 2s of DD Form 1348-1, **DOD Single Line Item Release/Receipt Document**.

10.9.2. Maintain supply order log (local electronic database) for all routine and expedite requests through base/aircraft supply.

10.9.3. Maintain a supply order log for all base/aircraft requests through the 9th Supply Squadron.

10.9.4. Maintain filing system for all SLOE items using AF IMT 2009-1, **Manual Supply Accounting Record**.

10.9.5. Establish a filing system for all copies of outgoing correspondence affecting the 9 PSPTS Supply Element.

10.9.6. Maintain WR-ALC/LRLDA fax order log for “GN” and “DN” part numbers.

10.9.7. Maintain and update material safety data sheets (MSDS) on all hazardous materials.

10.9.8. Maintain AFTO IMT 105, **Inspection Maintenance Firing Data for Ground Weapons**, for small arms through inspection and inventory.

10.9.9. Maintain all AF IMT 9s on suspense contracts.

10.10. Storage:

10.10.1. Provide over-the-counter issue of tool issue items to 9 PSPTS personnel.

10.10.2. Store required cold weather “B” bags for mobility tasking.

10.10.3. Ensure supplies and equipment stored in the warehouse are properly stored, tagged and labeled for immediate use, if requested.

10.10.4. Store munitions in munitions locker located in the Survival Equipment Element.

10.10.5. Store weapons in 9th Supply Squadron’s weapons vault when items are not required for deployment.

10.10.6. Maintain and dispose of all reusable containers.

10.11. Inventory:

10.11.1. All pilferable and accountable items (e.g., VCRs, computers, pagers, flares, munitions) will be secured at all times.

10.11.2. All non-life support pilferable items (e.g., cameras, radios, computers, etc.) will be etched with “US Government Property.” Tag all appropriate equipment assets with labels.

10.11.3. Photograph all pilferable items and maintain a log of 9 PSPTS property.

10.11.4. Perform inventory when required, normally quarterly. Perform an annual inventory of DSL and SLOE assets.

10.12. Inspection:

10.12.1. Inspect weapons when in storage on a quarterly basis and have them inspected upon return from the detachment by the 9th Security Force Squadron’s Small Arms Element.

10.12.2. Review all warehouse and shipment records quarterly to ensure warehouse levels are sufficient and factory repairs are accounted for upon return.

10.12.3. Review and update supply procedures which have changed or been deleted.

10.12.4. Inspect warehouse property for damages or shelf life.

10.13. Training:

10.13.1. Monitor supply personnel training records for AFSC 2S0X1, Inventory Management personnel. Conduct monthly meetings to review new regulations, operating instructions, training records, etc. Schedule personnel for special training classes when required.

10.14. Additional Duties. Perform duties on Shelter Management Team. Perform duties on Disaster Preparedness Team. Assist with deploying mobility cargo. Perform duties as fuels custodian for refueling building 1029 emergency generator, when required.

CHAPTER 11

QUALITY ASSURANCE/STANDARDIZATION AND EVALUATION

11.1. General. The 9 PSPTS commander will ensure a credible quality assurance/ standardization and evaluation program is maintained within the unit. The 9 PSPTS commander or designated representative will conduct biannual safety and procedural inspections of the 9 PSPTS portion of 9 RW OLs.

11.2. Quality Assurance and Standardization Evaluation Element. A Quality Assurance (QA) and Standardization and Evaluation Element will be established in 9 PSPTS and staffed by fully trained personnel. These personnel will provide for continuity, standardization of procedures and quality assurance of all physiological support equipment and training aids assigned to physiological support.

11.2.1. The element will be the point of contact for matters concerning Quality Air Force, Safety, Operational Risk Management and AFTO IMT 22 submission. They are also identified as wing exercise evaluation team members. This element is the focal point for the squadron's streamlined "A Suggestion About Process" program.

11.2.2. This element reviews and maintains all checklists and forms, monitors service bulletin compliance and conducts inspections to ensure proper maintenance of all technical data files. Contact supporting records managers as required to approve records retention and disposition.

11.3. Compliance Inspections. The QA/Standard Evaluation Element will conduct compliance inspections of each element at least semiannually. The Health Service Inspection checklist and the 9 PSPTS Compliance and Standardization Requirements List (C&SRL) will be the primary guides. Inspections may include, but are not limited to, procedures, record keeping and compliance with good safety practices. All findings will be given a tracking number and follow-up date. Serious or repeat discrepancies will be identified and emphasized in the report.

11.3.1. A report will be prepared and forwarded to the 9 PSPTS commander. Once reviewed by the commander, it will be sent to the appropriate flight for action. The flight has 10 duty days to answer all findings listed on the report. The flight will set estimated completion dates for all items that cannot be closed out. The flight will send a response to the 9 PSPTS commander for review. The QA/Standard Evaluation Element will file a copy of the response in the flight inspection folder and will track and follow-up on all items until they have been closed. Reports will be kept for 2 years. A file copy of the report will be forwarded to the 9th Medical Group commander and the manager of the USAF Pressure Suit Depot. Reports containing classified or sensitive items must not be e-mailed. Contact supporting records managers as required to approve records retention and disposition.

11.4. Quality/Standardization Assessment (QSA). This assessment is conducted on any item or process performed by physiological support personnel/elements. This is a no-notice assessment. These assessments involve observation of events ensuring compliance with established procedures and safety. This includes, but is not limited to, safety violations (unsafe acts), technical data violations (performance of a task without using technical data) or any condition not in compliance with established procedures.

11.4.1. Results from QSAs will be immediately briefed to the individuals performing the task and their immediate supervisor. A memorandum will be routed through the flight commander to the appropriate element. Discrepancies noted during the QSA will be logged. A trend analysis will be

published once a quarter for distribution to the flights. QA/Standard Evaluation Element personnel will also brief the trend analysis report to the squadron commander.

11.5. Quality Assurance Trend Analysis. The QA/Standard Evaluation Element is responsible for collecting all AF IMT 2420s from all the flights and the results will be entered into the trend analysis computer program. This information will be used to identify deficiencies in equipment and training. Special emphasis will be placed on new or recently acquired equipment.

11.5.1. Detachments and FOLs are required to forward their AF IMT 2420s to the QA/Standard Evaluation Element for inclusion in the unit's trend analysis program.

CHAPTER 12

PHYSIOLOGICAL SUPPORT COUNCIL

12.1. General. The Physiological Support Council (PSC) will serve as the central agency for the expedient review and timely solution of problems and recommended improvements pertaining to the physiological support program.

12.2. Objective. This section provides guidance for the establishment and operation of a wing PSC and designates council members.

12.3. Responsibilities:

12.3.1. Commanders will monitor and ensure compliance with the provisions of this section.

12.3.2. Applicable staff agencies will provide professional specialists and technical assistance in their area of interest, as required by the council.

12.3.3. The 9 PSPTS commander will convene and chair all high-altitude aircraft PSC meetings.

12.3.4. Each appointed PSC member will arrange for a qualified replacement when unable to attend scheduled meetings.

12.4. Purpose. The PSC will review, evaluate and resolve, if possible, any physiological support problem areas that may occur. The council will recommend courses of action to correct deficiencies or improve equipment, procedures and any other matters pertaining to physiological support operations.

12.5. Procedures:

12.5.1. The 9 RW will establish a PSC. The PSC will convene semiannually. Membership of the wing council consists of representatives from each of the following staff agencies:

12.5.1.1. Commander, 9th Physiological Support Squadron (Chairperson).

12.5.1.2. Wing staff representative.

12.5.1.3. 9th Medical Group Commander.

12.5.1.4. 9th Operations Group Commander.

12.5.1.5. Chief, Standardization and Evaluation.

12.5.1.6. Commander (or representative) from each U-2 flying squadron.

12.5.1.7. 9th Maintenance Group Commander.

12.5.1.8. Chief, 9 RW Safety.

12.5.1.9. Chief, Wing Quality Assurance.

12.5.1.10. Chief, Aerospace Medicine.

12.5.1.11. Wing Life Support Officer.

12.5.1.12. 9th Physiological Support Squadron personnel as required.

12.5.2. Additional members from other specialized and technical areas may be represented, as required.

12.5.3. Commanders of high altitude OLs will furnish the 9 PSPTS commander with information concerning problem areas, recommended improvement of equipment and procedures and recommendations/actions for physiological support operations.

12.5.4. Reports from FOL commanders concerning physiological support equipment or procedures will be discussed during the PSC meeting. Minutes of all council meetings will be recorded in accordance with AFI 37-126. Copies of minutes should be provided to HQ ACC/SGP and 9 PSPTS, Beale AFB CA, as appropriate.

HAL M. HORNBURG, General, USAF
Commander

ATTACHMENT 1

GLOSSARY OF REFERENCES AND SUPPORTING INFORMATION

References

AFI 11-301_ACCSUP1, (https://wwwmil.acc.af.mil/accpubs/pubs/11series/11series.htm.AFI11-301_ACCSUP1.pdf), *Aircrew Life Support (ALS) Program*

AFI 11-403, (<http://www.e-publishing.af.mil/pubfiles/af/11/afi11-403/afi11-403.pdf>), *Aerospace Physiological Training Program*

AFI 21-101_ACCSUP1, (https://wwwmil.acc.af.mil/accpubs/pubs/21series/21series.htm.AFI21-101_ACCSUP1.pdf), *Aerospace Equipment Maintenance Management*

AFMAN 33-326, (<http://www.e-publishing.af.mil/pubfiles/af/33/afman33-326/afman33-326.pdf>), *Preparing Official Communications*

AFI 44-108, (<http://www.e-publishing.af.mil/pubfiles/af/44/afi44-108/afi44-108.pdf>), *Infection Control Program*

Air Force Records Disposition Schedule (WebRIMS) at <https://webirms.amc.af.mil/rds/index.cfm?fuse-action=ListSeries>

Abbreviations and Acronyms

ACC—Air Combat Command

ACCI—Air Combat Command Instruction

AF—Air Force

AFI—Air Force Instruction

AFMAN—Air Force Manual

AFPD—Air Force Policy Directive

AFRC—Air Force Reserve Command

ALSMS—Aircrew Life Support Management System

ANG—Air National Guard

APTF—Aerospace Physiology Training Flight

C&SRL—Compliance and Standardization Requirements List

CFETP—Career Field Education and Training Plan

DCN—Design Change Notice

DCS—Decompression Sickness

DSL—Directed Spares Level

EAID—Equipment Authorization Inventory Data
ECP—Engineering Change Proposal
EEHS—Emergency Evacuation Hyperbaric Stretcher
FOL—Forward Operating Location
HAP—High-Altitude Parachutist
HARMS—High-Altitude Reconnaissance Mission Support
HPT—Human Performance Training
HQ—Headquarters
IAW—In Accordance With
IEE—Individual Equipment Element
IFE—In-Flight Emergency
IMPAC—International Merchants Purchase Authorization Card
LOE—Letter of Evaluations
MAJCOM—Major Command
MDR—Material Deficiency Reports
MOC—Maintenance Operations Center
MSDS—Material Safety Data Sheet
OL—Operating Location
OJT—On-The-Job Training
OPR—Office of Primary Responsibility
PC—Production Control
PMEL—Precision Measurement Equipment Laboratory
PSC—Physiological Support Council
QA—Quality Assurance
QSA—Quality/Standardization Assessment
T.O.—Technical Order
TCTO—Time Compliance Technical Order
TDC—Tech Data Change
UR—Unsatisfactory Report
USAFSAM—United States Air Force School of Aerospace Medicine
UTC—Unit Type Code
Forms/IMTs
ACC IMT 64, **Request for Placement on Special Certification Roster**

ACC IMT 145, **Lost Tool/Object Report**
AF IMT 9, **Request for Purchase**
AF IMT 601, **Equipment Action Request Document**
AF IMT 699, **Physiological Training Record**
AF IMT 781, **Multiple Item Prescription**
AF IMT 847, **Recommendation for Change of Publication**
AF IMT 2005, **Issue/Turn-in Request Document**
AF IMT 2009-1, **Manual Supply Accounting Record**
AF IMT 2420, **Quality Control Inspection Summary**
AF IMT 3215, **Communications-Computer Systems Requirement Document**
AFTO IMT 22, **Technical Manual TM Change Recommendation and Reply**
AFTO IMT 95, **Significant Historical Data**
AFTO IMT 105, **Inspection Maintenance Firing Data for Ground Weapons**
AFTO IMT 334, **Helmet and Oxygen Mask/Connector Inspection Data**
AFTO IMT 336, **Life Preserver Inspection Record**
AFTO IMT 338, **Survival Kit Record**
AFTO IMT 391, **Parachute Log**
AFTO IMT 392, **Parachute Repack, Inspection and Component Record**
Beale Form 356, **Inspection Data Timeline**
DeCA Form 70-20, **Subsistence Request**
DD Form 250, **Material Inspection and Receiving Report**
DD Form 1149, **Requisition and Invoice/Shipping Document**
DD Form 1155, **Order for Supplies or Services**
DD Form 1348-1, **DOD Single Line Item Release/Receipt Document.**
DD Form 1348-6, **DOD Single-Line Item Requisition System Document**